

DETAILED ACTION

Acknowledgments

1. This office action is in response to the reply filed on 1/28/2010.
2. In the reply, the Applicant amended claims 13 and added new claims 28. Claims 19-20 were previously withdrawn.
3. Thus, claims 13, 15-16, 18, 21, 23-28 are pending for examination.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 13, 15-16, 24-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jackson (4623335) in view of Woodworth et al (4550747). Jackson discloses an apparatus for regulating pressure applied during a medical procedure, comprising: an inelastic housing (24) enclosing an inner volume, the housing having a first and second end (respective ends of syringe 24 and 26) wherein the housing (10; or all elements basically forming the device structure such as 24, 26, 40, 22, 44, 64, etc...) the applicant has not structurally defined the housing to preclude elements 64 from forming a part of the housing) comprises a cylindrical inelastic housing enclosing the inner volume (can include all inner volumes – from 24 to 58) and a plunger (25); an aperture (56) in the housing for conveying pressure from the housing during medical procedure, and a pressure-operated valve (22; Fig 2) coupled between the inner volume

of the housing and a space outside of the inner volume of the housing for allowing pressure to escape from the inner volume of the housing through the valve when pressure in the housing exceeds a threshold, whereby the valve releases pressure from within the inner volume of the housing (Figs 1-4; col 5, Ins 32-col 6, Ins 3); wherein the pressure operate valve comprises and opening (68), a plunger (44) disposed within the inner volume of the housing; a spring (52) disposed within the inner volume of the housing, wherein the spring is positioned between the second end of the housing and the plunger (Fig 2), wherein the plunger in a rest position is between the opening and the aperture (Fig 2), and wherein as fluid is inserted into the inner volume of the housing via the aperture, increased pressure within the inner volume of the housing moves the plunger toward the opening (Figs 1-4; col 5, Ins 32-col 6, Ins 3); wherein the opening is positioned in a side of the housing providing access to the inner volume of the housing (68; Fig 2), wherein at normal pressure the opening is closer to the second end than the plunger and wherein as pressure within the inner volume of the housing increases so as to move the plunger past the opening (Figs 1-4), the pressure within the inner housing is released through the opening (Figs 1-4; col 5, Ins 32-col 6, Ins 3); wherein the threshold is set by a spring exerting a force which must be overcome to exceed the threshold (Figs 1-4; col 5, Ins 32-col 6, Ins 3).

6. However, Jackson does not disclose that the pressure operated valve is adapted to allow selection of the threshold, during use, from a plurality of different pre-set thresholds, wherein the threshold pressure levels intermediate of two of any of said discrete, pre-set threshold pressure levels cannot be selected; wherein a movable

member which can be positioned between at least two different positions corresponding to different forces of the spring which must be overcome to exceed the threshold.

7. Woodworth et al teaches that it is known to have a pressure operated valve adapted to allow selection of the threshold during use from a plurality of different thresholds (Summary; col 1, Ins 11-15; col 5, Ins 60-67) wherein the threshold pressure levels intermediate of two of any of said discrete, pre-set threshold pressure levels cannot be selected (Summary; col 1, Ins 11-15), wherein the user controls the force and thus the threshold via the adjustment member and a movable member (piston) which can be positioned between at least two different positions corresponding to different forces of the spring which must be overcome to exceed the threshold (Summary; col 1, Ins 11-15; col 5, Ins 60-67) for the purpose of having a user set computer controlled pressure relief valve with improved accuracy over more than one user set discrete pressure value. It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the spring system as taught by Jackson with the having spring system, piston, and a user set computer controlled pressure relief valve as taught by Woodworth et al for the purpose of having a user set computer controlled pressure relief valve with improved accuracy over more than one user set discrete pressure value.

Allowable Subject Matter

1. Claims 21, 23, 26, 27, 28 are allowed.

2. Claim 18 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

3. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. See PTO 892 Form.

5. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW M. GILBERT whose telephone number is (571)272-7216. The examiner can normally be reached on 8:30 am to 5:00 pm Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Sirmons can be reached on (571)272-4965. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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